

County of Loudoun
Department of Planning
MEMORANDUM

DATE: January 6, 2009

TO: Ginny Rowen, Project Manager
Land Use Review

FROM: ^{RG} Pat Giglio, Planner
Community Planning

SUBJECT: CMPT 2007-0015, Landsdowne (Revised)

BACKGROUND

Nextel Communications of the Mid-Atlantic Inc. (Sprint Nextel), the applicant, is requesting a Commission Permit to locate nine (9) telecommunication panel antennas and four (4) GPS antennas on the National Conference Center, located at 18940 Upper Belmont Place, Lansdowne. The Conference Center is an irregular shaped multi-story brick building that terminates in a series of flat roofs with parapets. The building-mounted telecommunication antennas will be attached to the exterior wall of the penthouse and will be painted the same color of the building. The antennas will be visible from the grounds of the Conference Center and surrounding properties. All the associated telecommunication cabinets and equipment will be located within a mechanical room on the interior of the building.

The subject site is zoned Planned Development–Special Activity (PD-SA) and governed under the provisions of the Revised 1993 Zoning Ordinance. In accordance with the Revised 1993 Zoning Ordinance, telecommunication antennas are permitted by-right on existing structures forty (40) feet in height or greater, but a Commission Permit is required whenever a public utility or public service facility is constructed. A Commission Permit is used to determine if the general location, character, and extent of the proposed use is in substantial accord with the Comprehensive Plan.

The installation of the proposed antennas and associated equipment on the existing building requires no land disturbance or impact on any aspects of the Green Infrastructure as outlined in the Revised General Plan.

COMPREHENSIVE PLAN CONFORMANCE

The site is located in the Ashburn Community within the Suburban Policy Area and is governed under the policies of the Revised General Plan (the Plan). The Revised General Plan designates this area for Residential uses (Revised General Plan, Chapter 7, Planned Land Use). The proposed use is specifically governed under the policies of the Strategic Land Use Plan for Telecommunications Facilities (Telecommunications Plan).

ANALYSIS

A. LOCATION POLICIES

To minimize the need for new facilities, the Telecommunications Plan directs that new commercial telecommunication antennas be located on "existing buildings, towers, monopoles, water tanks, overhead utility transmission line structures and other tall structures wherever possible" (*Telecommunications Plan, Policy 1, p. 3*). The proposed site is considered a preferred location because it effectively uses the height of the existing building to provide improved wireless coverage to the area without requiring the construction of a new tower or monopole. The proposed location of the antennas on the penthouse is consistent with Plan policies and countywide goals to minimize the need for construction of new towers and monopoles (*Telecommunications Plan, Countywide Location Policies, Policy 1*).

Staff finds the proposed site and location of the building mounted antennas on the existing penthouse is an appropriate and preferred location as identified by the Plan.

B. DESIGN GUIDELINES AND VISUAL IMPACT

The Telecommunications Plan calls for design standards to mitigate the visual impacts of commercial public telecommunications facilities so as to "blend with the natural and built environment of the surrounding area." The Plan directs that specific attention be paid to issues pertaining to the setting, color, lighting, topography, materials, and architecture. Antennas and other telecommunication devices should be neutral in color to blend with the background, unless specifically required by the FAA to be painted or lighted otherwise (*Telecommunications Plan, Tower and Monopole Design, Policy 2*). Accessory structures and equipment buildings should also blend with the surrounding environment through the use of appropriate color, texture of materials, scale, landscaping, and visual screening (*Telecommunications Plan, Countywide Visual Impacts, Policy 3*).

The application includes drawings and photo-simulations depicting how the nine (9) telecommunication panel antennas and four (four) GPS antennas will appear in association with the existing building. The antennas will be mounted on the northeast, northwest and southeast elevations of the irregular shaped penthouse and will be painted to match the color of the building. The associated

telecommunication cabinets and equipment will be located within a mechanical room on the interior of the building. The proposed antennas will be visible from different vantage points around the building but based on their size and location of the antennas on the upper portions of the building views should be negligible.

Staff finds the overall design and visual impact of the proposed antennas on the existing building to be in conformance with the design guidelines for telecommunication facilities. Staff recommends the applicant commit to the details of the facility design as proposed by including notes on the submitted plats.

C. SAFETY AND HEALTH POLICIES

Plan policies state "an applicant or its successors shall remove all unused structures and facilities from a commercial public telecommunications site, including towers and monopolies, within 90 days of cessation of commercial public telecommunications use or the expiration of the lease, whichever occurs first, and the site should be restored as closely as possible to its original condition" (*Telecommunications Plan, Safety and Health Policies, Policy 2*).

Staff recommends that the applicant commit to removal of the facility following cessation of use proposed by including notes on the submitted plats.

RECOMMENDATIONS

Staff finds that the application is in conformance with the general location and design policies outlined in the Revised General Plan and Strategic Land Use Plan for Telecommunications Facilities which identifies co-location on existing tall structures as a preferable location for telecommunication antennas. Staff finds that the proposed installation of the building-mounted telecommunication antennas on the penthouse of the existing building will have a negligible visual impact on the surrounding area. Staff recommends that applicant commit to the proposed details of the facility design and removal of the facility following cessation of use.

Staff recommends approval of the subject Commission Permit.

cc: Julie Pastor, AICP, Planning Director
Cindy Keegan, AICP, Program Manager, Community Planning – via e-mail

Community Planning offers the following recommendations and comments for revision to the submitted plats revised through 7/10/08 in response to first referral and will not be submitting a formal second referral.

1. Add a note to include removal of the antenna and equipment following cessation of use
2. Remove a portion of the note on sheet CO1 pertaining to the coloration of cable trays and antennas which states "or a medium gray to match the skyline". The drawings illustrate that all antennas and cable trays will be building mounted and will not protrude above the roof line making the language unnecessary. Also in the future it is anticipated that any other antennas will be building mounted in substantial accord with the drawings and the current commission permit request.

Pat Giglio, Planner
Community Planning Division

COUNTY OF LOUDOUN
DEPARTMENT OF BUILDING AND DEVELOPMENT
ZONING ADMINISTRATION REFERRAL



DATE:

January 7, 2009

TO:

Ginny Rowen, Project Manager, Planning

FROM:

Nita Bearer, Zoning Planner *mb*

CASE NUMBER AND NAME:

CMPT-2007-0015
Lansdowne

LCTM/MCPI:

/50/////////4/
081-36-9067

PLAN SUBMISSION NUMBER:

1st Referral

APPLICATION SUMMARY

Zoning staff has reviewed the above referenced commission permit application for conformance with the Revised 1993 Loudoun County Zoning Ordinance. The materials submitted for review of the application consist of the following:

1. Information Sheet
2. Statement of Justification dated June 5, 2007 and revised through November 12, 2007
3. RF propagation maps
4. Photo simulations
5. Plat dated July 2008 and revised through July 10, 2008

The subject property is zoned Planned Development-Special Activity (PD-SA, is regulated by the Revised 1993 Loudoun County Zoning Ordinance, and is subject to the proffers associated with ZMAP-1994-0001 and the concept development plan ZCPA-1994-0002. Pursuant to Section 4-703(AA), telecommunications antennas are a permitted use in the PD-SA zoning district, subject to the additional regulations of Section 5-618(A).

ISSUES

1. Correct the "Zoning Bulk & Design Requirements" table on Sheet T01 to reflect yard requirements of the PD-SA zoning district (Section 4-705). Adjacent to

Attachment 1B

A-5

roads: Building -- 35', Parking -- 25', except where a greater setback is required by Section 5-900; Adjacent to residential districts: 100'; Adjacent to non-residential districts: 35'; Between buildings: 25'.

2. According to the Ground Floor Plan on Sheet C02, condensers associated with the use will be located outside of the building. In order to clarify that not all of the accessory equipment will be located within the building, indicate in the "Project Description" on Sheet T01 that some of the accessory equipment associated with the use will be located outside of the building.

STATEMENT OF JUSTIFICATION
APPLICATION OF NEXTEL COMMUNICATIONS OF THE MID-ATLANTIC, INC. FOR
COMMISSION PERMIT REVIEW
JUNE 5 NOVEMBER 12, 2007

R E C E I V E D

JAN 10 2008

PLANNING DEPARTMENT

Introduction

Nextel Communications of the Mid-Atlantic, Inc., (Sprint Nextel) is a wireless communications carrier licensed to provide service in the Baltimore and Washington D.C. markets which includes Loudoun County, Virginia. Sprint Nextel is one of the nation's largest providers of personal wireless services and was formed from the merger between Sprint and Nextel in 2005. Pursuant to section 15.2-2232 of the Code of Virginia, 1950, as amended, Sprint Nextel applies for a Commission Permit to allow a telecommunications use on a leased portion of the building located at 18940 Upper Belmont Place, Lansdowne, VA 20176, which property is identified in the County land records as PIN # 081-36-9067 (the "Site").

Proposed Use

Sprint Nextel seeks a Commission Permit to allow installation and operation of an unmanned wireless antenna co-location facility. This facility is designed to be installed on the façade of the penthouse of the Site to blend in with the architecture of the building so as to minimize visual impacts. The equipment necessary to support the antennas is proposed to be located in an equipment room on the ground floor of the building as more specifically shown on the plans. All Nine (9) of the antennas will be mounted in three (3) sectors as shown on the plans. Sprint Nextel will use this Site to provide both CDMA and iDEN technologies to its customers in the area, allowing those customers to have access to a full complement of Sprint Nextel services.

An accompanying set of photo simulations depicts the proposed installation from several points in the general vicinity of the Site.

Why This Site Was Selected

This proposed facility is critical because it will provide improved wireless coverage to a coverage gap the following areas: the National Conference Center and Upper Belmont Place; the Belmont Ridge Middle School; River Point Drive and surrounding neighborhoods; and the new residential areas along Kipheart Drive and Ridgeback Court. The proposed co-location facility will also serve as a necessary link in the area wide wireless network that Sprint Nextel is expanding in Loudoun County.

For commercial wireless service providers, quality of service is the number one concern of the more than 216 million Americans who subscribe to wireless communications services. In order to provide quality service, the carriers must develop a network of radio links—all of which must be within a certain proximity to one another. Otherwise, network "dead spots" exist, causing dropped calls or an inability to access the wireless network. The proposed location for this co-location facility helps fill a large coverage gap surrounding the Site and adjacent developments. Set on the penthouse on the roof of this multi-story structure, this is an ideal use of an existing building to support co-located facilities. This proposed co-location facility will allow a number of

Attachment 2

A-7

wireless customers who live, work and visit Loudoun County to experience enhanced service with no adverse impact on the public.

In addition to the general public, use of wireless services by the state, county and local first responders is widespread and frequent. In particular, Sprint Nextel services have been depended on by police, fire, EMS and rescue service in addition to and sometimes instead of their own radio service. In an era when networks can quickly reach capacity constraints during periods of heavy use, added capacity can be of critical importance.

The proposed Site was selected because it is strategically located in relation to other existing or planned wireless base stations and will provide the widest and most efficient coverage of the area while minimizing its visual impact on major thoroughfares and neighboring communities.

Along with this statement, Sprint Nextel has provided radio frequency (RF) propagation maps that demonstrate the need for this co-location facility and the existing network conditions. The objective is to provide "in-building" coverage where possible, which is indicated by the color green on the map. As is shown, the coverage to the area surrounding the Site is significantly improved with the addition of this co-location facility.

External Impact

The proposed co-location facility will have no impact on air quality, water quality, radiation exposure, light pollution, noise pollution or traffic congestion or circulation. The proposed antennas emit no noise, light or odors. The co-location facility will typically receive just one or two service/ maintenance calls per month. This maintenance calls will have no discernable traffic impact. Sprint Nextel is licensed by the FCC and operates its equipment in full compliance with FCC rules and regulations. Furthermore, the design of the proposed co-location facility is intended to blend with the existing architecture so that the antennas and mounting brackets will be hardly noticeable. The location of the equipment room entirely within the building was designed to further reduce potential visual impacts.

In the event that Sprint Nextel no longer has a need for the co-location facility, Sprint Nextel will remove its equipment from the Site within ninety (90) days of the cessation of use or the expiration of the lease, whichever first occurs. Sprint Nextel will repair any damage that is caused by the removal of its antennas and equipment from the Site.

Relationship to the Comprehensive Plan and the Zoning Ordinance

1. The Comprehensive Plan. The Strategic Land Use Plan for Telecommunications Facilities (the "Plan") was adopted as part of Loudoun County's Comprehensive Plan in November 1996. The Plan states that "modern, effective and efficient telecommunications is an essential part of creating an attractive economic development environment". One of the stated purposes of the Plan is to "require collocation of commercial public telecommunications facilities on existing structures". In addition, the Plan states as policy "...ensuring appropriate siting and design, and mitigating impacts of telecommunications facilities." Listed among the stated design considerations are those that mitigate visual impact "so as to blend with the natural and built environment of the surrounding area".

The proposed facility is fully responsive to all applicable planning and design considerations. As shown on the accompanying plans and photo simulations, the use of a large existing structure allows the proposed facilities to

blend into the built environment. The panel antennas will be painted to match the color of the existing penthouse to further blend into the architecture of the building. The location of the equipment room within the building fully hides the equipment from view.

2. The Zoning Ordinance. As provide in Section 5-618 (A)(1) of the Zoning Ordinance, “antennas and related unmanned equipment” are permitted in all zoning districts as a matter of right, subject to design criteria and Commission Permit. The proposed installation meets the design criteria set forth in subsections (A)(3) through (10). As indicated above and in the accompanying plans, RF coverage maps, and photo simulations, the proposal is consistent with the applicable performance standards and design standards:

- The panel antennas and related equipment will all be within the size and height limitations specified in the ordinance. The equipment room will be located entirely within the building and thus will not be visible from the outside. There will be no commercial advertising on the Site.
- There will be no signals or lights or illumination on any antenna unless required by state or federal authorities or the County
- The Site is not located within a County designated historic area.

Conclusion

The proposal described above is wholly consistent with the policies and standards for the placement of commercial public telecommunications facilities in the County as set forth in Loudoun County’s Comprehensive Plan and Zoning Ordinance. Sprint Nextel’s installation will comply with all applicable development and building codes and its proposed use will conform to all ordinances, regulations, adopted standards and conditions. More reliable and comprehensive wireless communications services facilitate commerce, improve public safety and contribute to the general welfare and convenience of all who live, work or travel through Loudoun County. Moreover, the proposed facility will do all of this with a design that is compatible with the environment and at a location that assure the least, if any, visual impact on the surrounding area. Accordingly, Sprint Nextel respectfully requests approval of its Land Development Application for the Commission Permit.

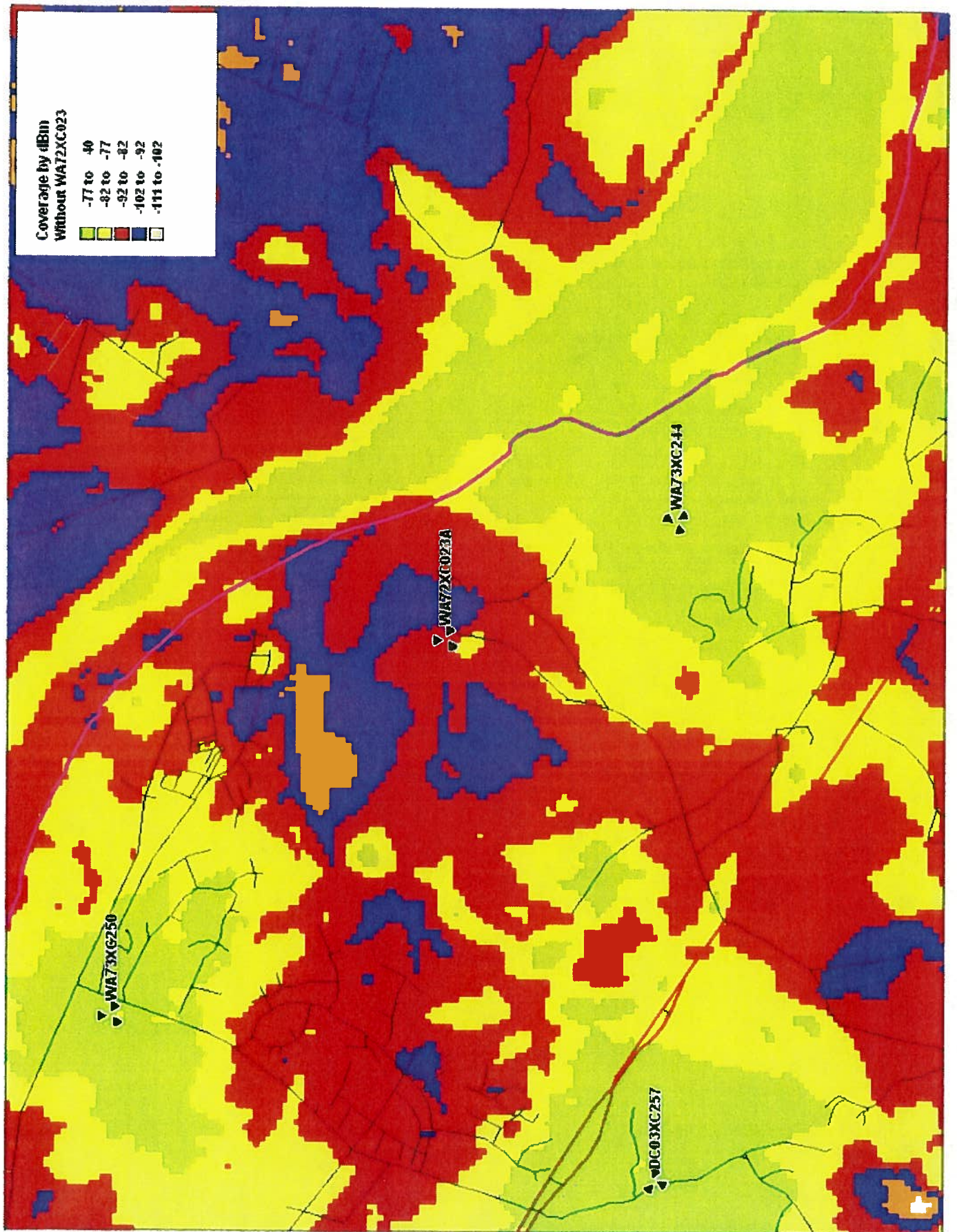
RF justification

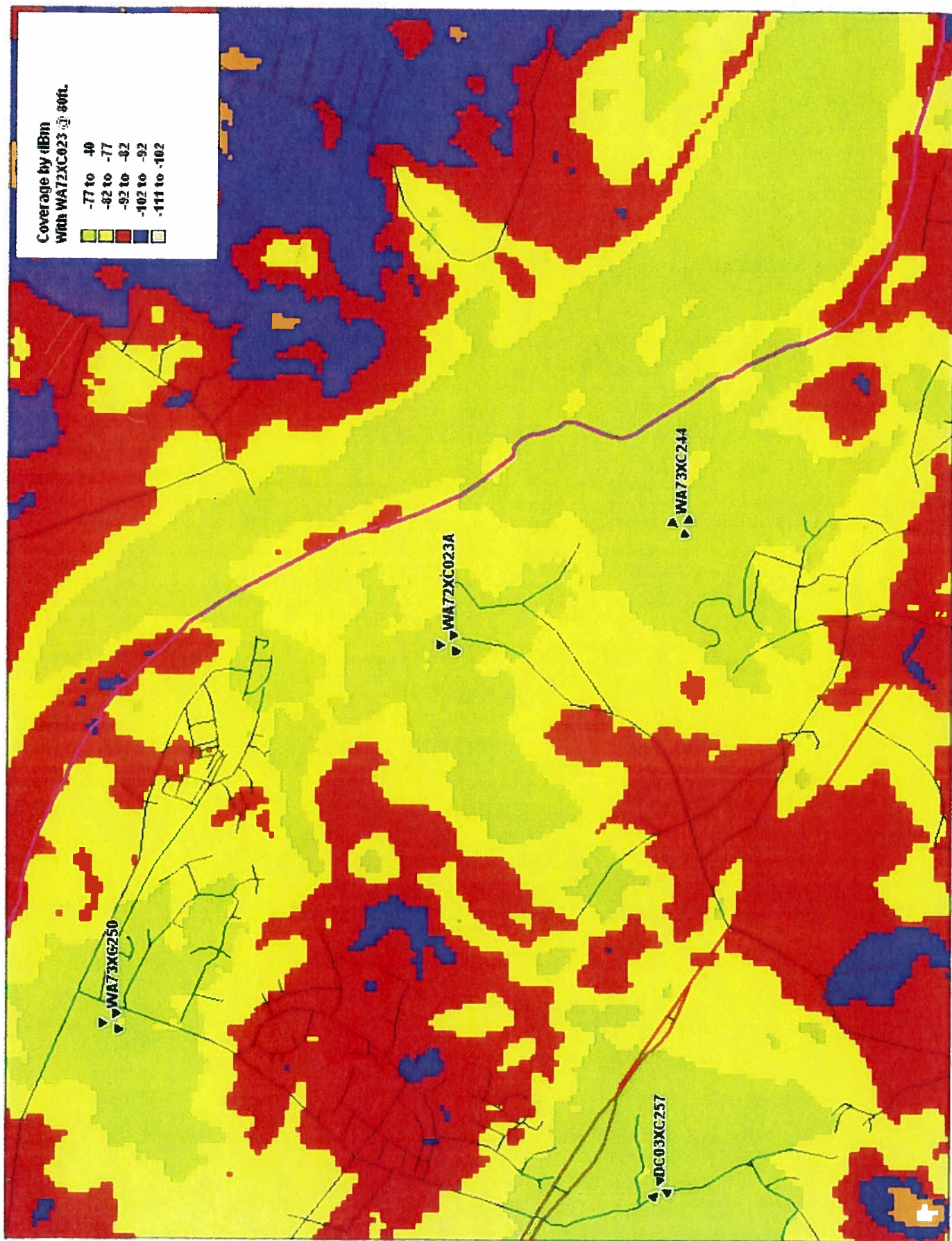


- The objective of the proposed facility is to fill in a coverage gap that currently exists in the following areas:
- The National Conference Center and Upper Belmont Place
- Belmont Ridge Middle School
- River Point drive and surrounding neighborhoods
- New residential areas along Kipheart Dr. and Ridgeback Ct.

Surrounding site information:

- WA73XC250: Co-location on transmission tower (in construction)
- DC03XC257: Monopole at Goose Creek Golf Club (On-air)
- WA73XC244: Co-location on Lansdowne Resort rooftop (proposed)





RF Justification

The objective of the proposed facility is to fill in a coverage gap that currently exists in the following areas:

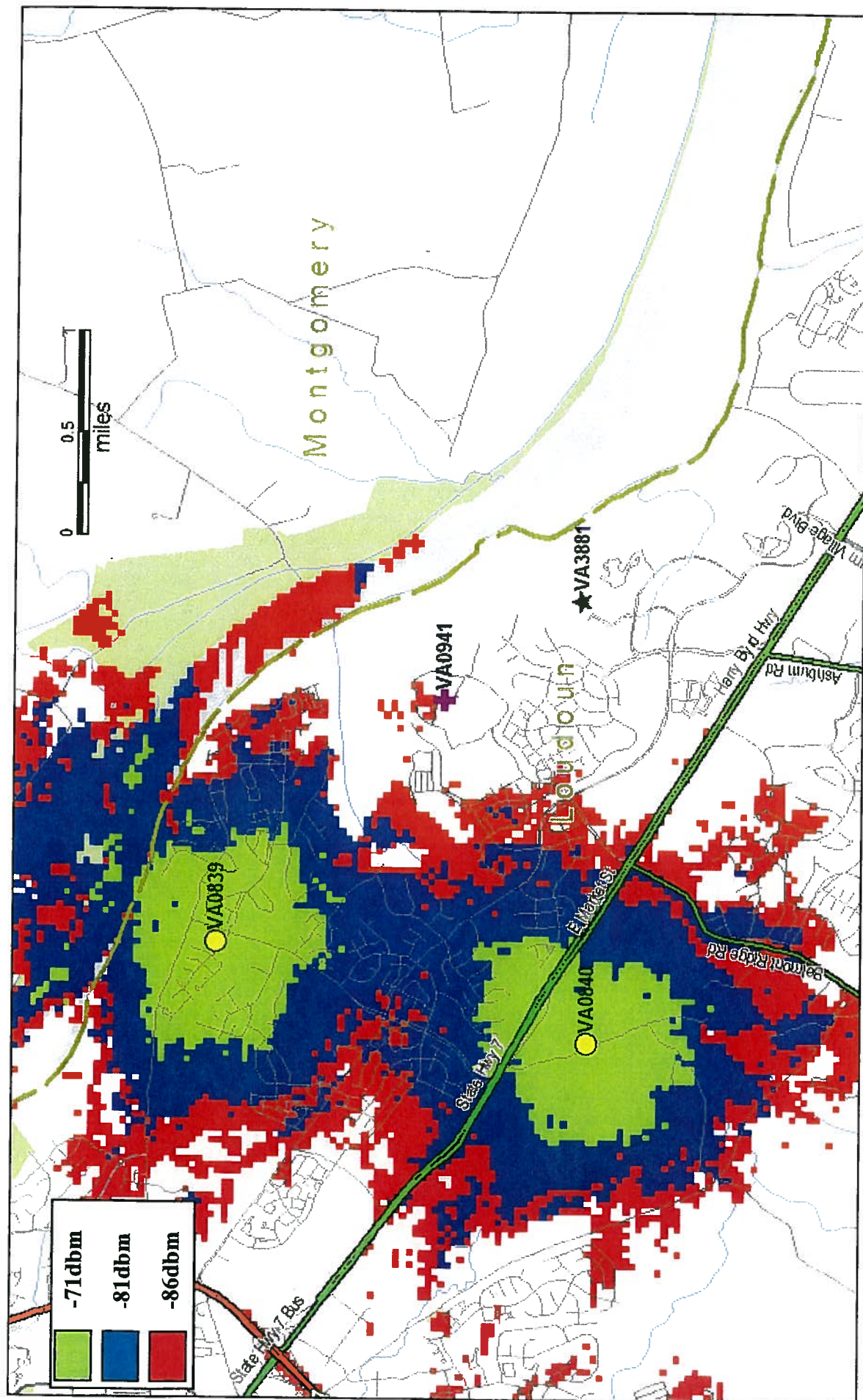
- The National Conference Center and Upper Belmont Place
- Belmont Ridge Middle School
- River Point drive and surrounding neighborhoods
- New residential areas along Kipheart Dr. and Ridgeback Ct.

Surrounding site information:

- VA0839: Co-location on transmission tower (On-Air)
- VA0840: Monopole at Goose Creek Golf Club (On-Air)
- VA3881: Co-location on Lansdowne Resort rooftop (Future)

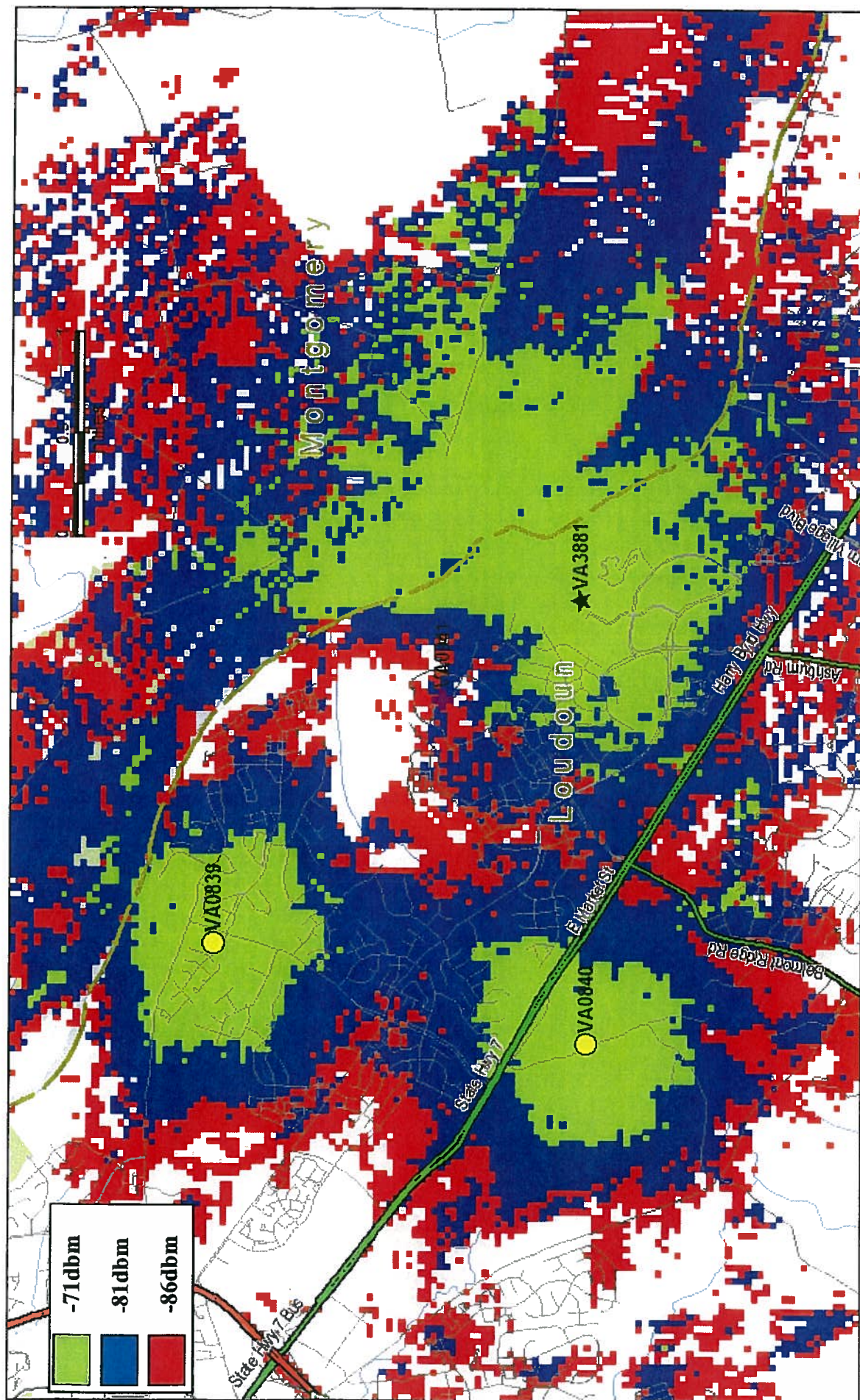
VA0941 – Current Coverage

- On-Air Sites
- Future Sites
- Proposed Site



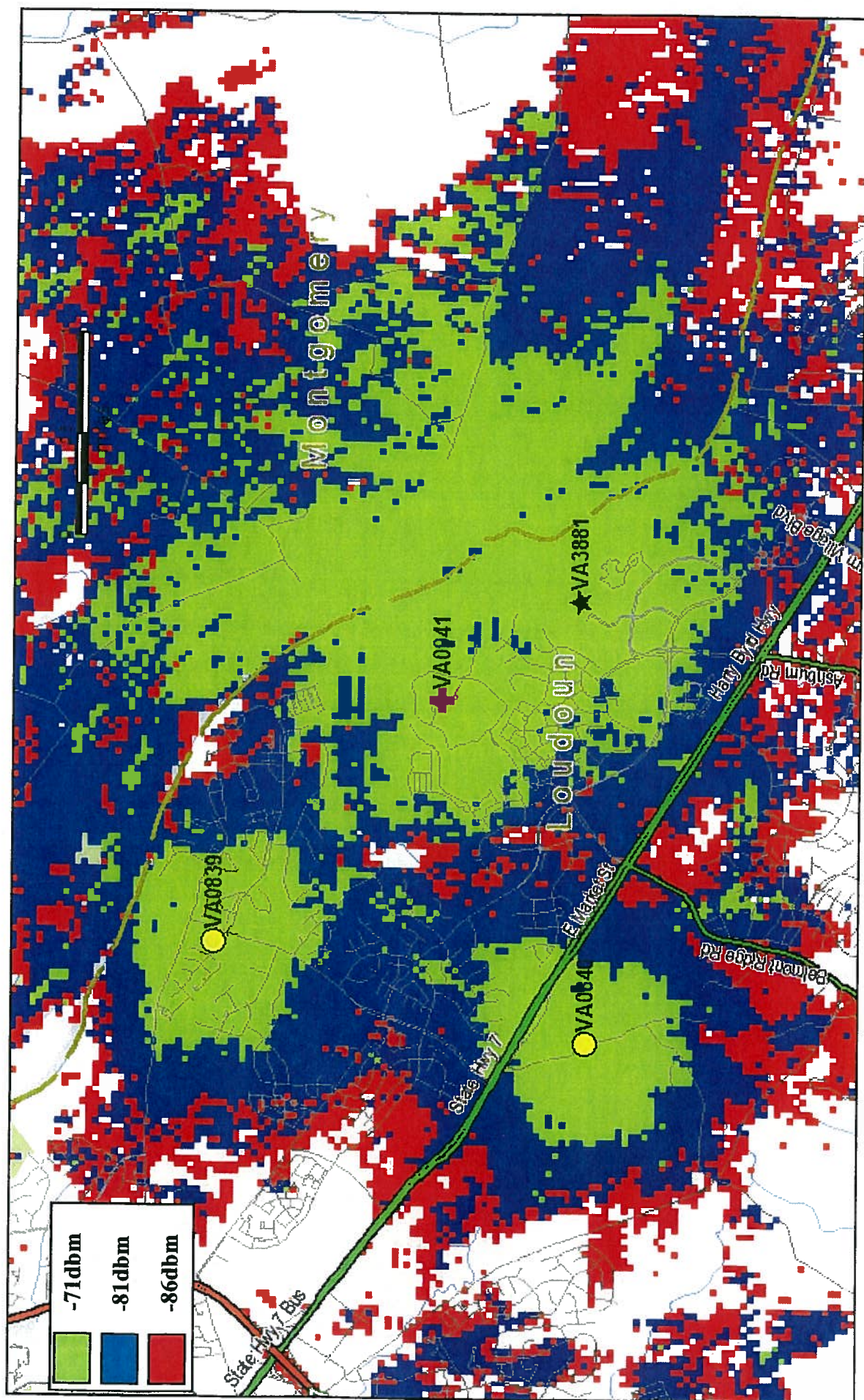
VA0941 – Coverage With A Future Site

- On-Air Sites
- Future Sites
- Proposed Site



VA0941 – Coverage With Future and Proposed Sites

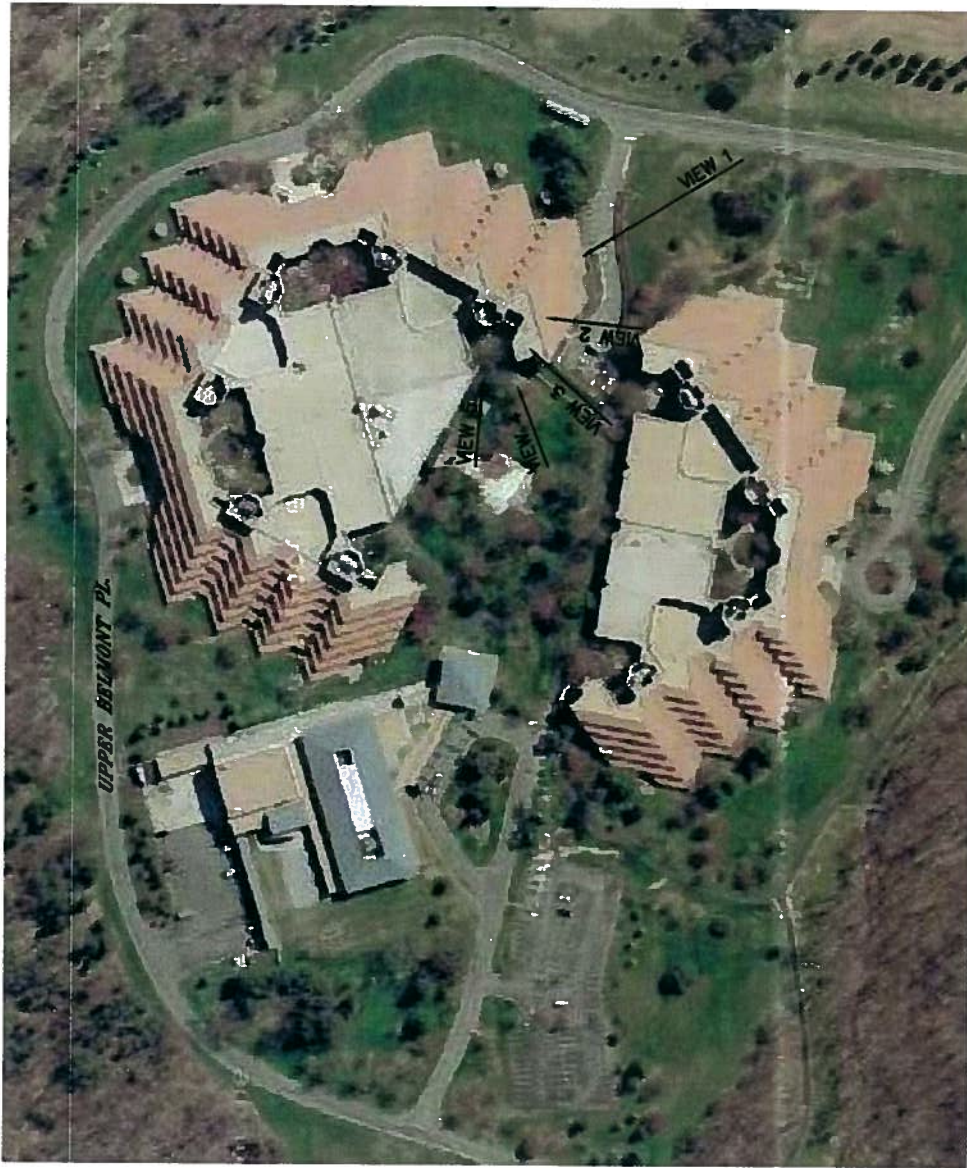
- On-Air Sites
- ★ Future Sites
- ✚ Proposed Site





LEGEND:

- VIEW 1 - EXISTING VIEW LOOKING NORTHWEST TOWARD EAST SIDE OF BUILDING (VISIBLE)
- VIEW 2 - EXISTING VIEW LOOKING NORTH TOWARD SOUTH SIDE OF BUILDING (VISIBLE)
- VIEW 3 - EXISTING VIEW LOOKING NORTHEAST TOWARD SOUTH SIDE OF BUILDING (NON-VISIBLE)
- VIEW 4 - EXISTING VIEW LOOKING EAST TOWARD WEST SIDE OF BUILDING (VISIBLE)
- VIEW 5 - EXISTING VIEW LOOKING EAST TOWARD WEST SIDE OF BUILDING (NON-VISIBLE)



1 AERIAL PHOTOGRAPH
NO SCALE

NEXTEL

COMMUNICATIONS OF
THE MID-ATLANTIC, INC.
7055 SAKARIL LANE DRIVE
SUITE 100
COLUMBIA, MD 21048
PHONE: (410) 953-7400

CHA

CHANDLER HARRISON & ASSOCIATES LLP
1000 EAST TOWERS, SUITE 2000, FORT MYERS, FL 33902
TEL: 888-344-2222 FAX: 888-344-2223
10000 - 10000 - 1000

NO.	DATE	REVISION
1	12/20/07	ISSUED FOR REVIEW
2	01/10/08	ONE SET
3	01/10/08	ONE SET
4	01/10/08	ONE SET
5	01/10/08	ONE SET
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19	01/10/08	ONE SET
20	01/10/08	ONE SET

IT IS A VIOLATION OF LAW FOR ANY PERSON
UNLESS THEY ARE ACTING UNDER THE DIRECTION
OF A LICENSED PROFESSIONAL ENGINEER,
TO ALTER THIS DOCUMENT.

VA 0941 B
SITE NAME:
LANSDOWNE
SITE ADDRESS:
18940 UPPER BELMONT
PLACE
VIENNA, VA
22182
LOUDOUN COUNTY

SHEET TITLE
AERIAL
PHOTOGRAPH

SHEET NUMBER
AP01



Photosim for conceptual purposes only - actual antenna & equipment locations to be determined based on final engineering design



Clough Harbour & Associates LLP

DATE: DEC 2006

SITE: VA0941

VIEW 1 - PROPOSED
VIEW LOOKING NORTHWEST
TOWARD EAST SIDE OF BUILDING



COMMUNICATIONS OF THE MID-ATLANTIC, INC
7055 SAMUEL MORSE DRIVE SUITE 100
COLUMBIA, MD 21046



Photosim for conceptual purposes only - actual antenna & equipment locations to be determined based on final engineering design



DATE: DEC 2006

SITE: VA0941

VIEW 2 - PROPOSED
VIEW LOOKING NORTH TOWARD
SOUTH SIDE OF BUILDING



COMMUNICATIONS OF THE MID-ATLANTIC, INC
7055 SAMUEL MORSE DRIVE SUITE 100
COLUMBIA, MD 21046



Photosim for conceptual purposes only - actual antenna & equipment locations to be determined based on final engineering design



Clough Harbour & Associates LLP

DATE: DEC 2006

SITE: VA0941

VIEW 3 - NOT VISIBLE
VIEW LOOKING NORTHEAST TOWARD
SOUTH SIDE OF BUILDING



COMMUNICATIONS OF THE MID-ATLANTIC, INC
7055 SAMUEL MORSE DRIVE SUITE 100
COLUMBIA, MD 21046



Photosim for conceptual purposes only - actual antenna & equipment locations to be determined based on final engineering design



DATE: DEC 2006

SITE: VA0941

VIEW 4 - PROPOSED
VIEW LOOKING EAST TOWARD WEST
SIDE OF BUILDING



COMMUNICATIONS OF THE MID-ATLANTIC, INC
7055 SAMUEL MORSE DRIVE SUITE 100
COLUMBIA, MD 21046

DONOHUE
& BLUE PLC



January 23, 2009

Mr. Pat Giglio, Project Manager
Loudoun County Department of Planning
1 Harrison Street, SE
Third Floor
Leesburg, VA 20177

Re: CMPT 2007-0015
Sprint Nextel Application/Lansdowne

Dear Pat:


In response to comments prepared by staff and dated January 5, 2009, we have made minor revisions to the plans for the referenced facility.

We submit this application should be considered for expedited treatment and transmitted promptly to the Planning Commission as a consent agenda item. The proposed flush-mounted antenna on the penthouse of the very large commercial building located on the sprawling campus on Xerox Drive will be all but invisible to anyone. The equipment associated with these antennas is proposed to be located in interior space, within the penthouse. Accordingly, we believe this installation should be expedited and approved.

As staff has noted in the comments received, this is a preferred location and wholly consistent with approved telecommunications policies and design guidelines.

Thank you.

Sincerely,


Edward L. Donohue

cc: Steve Kinley, ACO Property Advisors
Ginny Rowen, Project Manager